Cancer of the Breast.—He favors the radical operation with removal of the axillary glands, and quotes a number of cases so treated with an immunity of from eighteen months to three years.

Cancer of the Rectum, comparing his experience with the statistics of foreign writers, is not so frequent in this country as in England and Europe. He is inclined to advise as little interference with the disease locally as possible, unless it be seen at a very early stage, which has never occurred to him.

Cancer of the Œsophagus has been very unsatisfactory in his hands when treated locally by dilatation of the stricture, and in a case not yet complete, he has tried gastrostomy.

Treatment with drugs, including Chian turpentine, has given negative results in his hands.—*Boston Med. and Surg. Jour.*, February 17, 1887.

V The Question of Operation in Perityphlitic Abscess. By R. F. WEIR, M.D. (New York). In case of a man æt. 22 years, with a history of abdominal pain and evacuation of sero-purulent fluid by a needle inserted to the depth of an inch and a half in the right iliac fossa, but with no marked dulness or swelling, an incision along an aspirator needle evacuated pus and, although at first the abscess cavity seemed to be limited by adherent coils of intestine, the general cavity of the peritoneum was found to be involved in a suppurative peritonitis. Median laparotomy revealed a perforating ulcer at the root of the vermiform appendix on its free surface posteriorly throughout the entire length; the entire appendix was tied off with catgut, the abdominal cavity douched with warm water and a duplicature of iodoform gauze inserted into the midst of the intestines in the iliac fossa and in the pelvis—Miculicz's method; drainage was provided and the incision's closed. The patient rallied well from the operation, but died on the next afternoon. There were two points of especial interest connected with the case. One was the difficulty of determining without exploratory iliac incision, and sometimes even after this was done, whether or not the typhlitic abscess was yet a local affair; peritoneal symptoms were not infrequently seen with

perityphlitic inflammations, especially with that variety that resulted in limited peritoneal abscess. The absence of tumor and the profuseness of thin sero-pus led to a renewed and thorough examination, which had hitherto been refrained from, lest limiting protective adhesions should be broken down. The second point was the treatment of the perforated appendix. Should the sloughy opening be trimmed off and inverted and closed as in an intestinal perforation, and the appendix preserved or should it be boldly removed as in this case? The closeness of the perforation to the cæcum interfered with his desire to cut away the sloughy edge left even after the excision of the appendix, but, where practicable, he thought this should be done before the Lembert sutures were applied. He, however, knew that simple ligature had frequently sufficed where the appendix had been removed in this and other difficulties, and he favored the usual extirpation of the appendix as not adding to the risk and preventing future trouble.

There were cases in which the boundary wall of a perityphlitic abscess was formed by coils of small intestine glued together, and he could recall three instances which had occurred tolerably recently in which, after the abscess had been opened, he could feel with his finger the inner wall of the abscess thus formed. The extensive researches of Treves utterly disproved the old idea of the cæcum and appendix being continuous posteriorly or otherwise with the subperitoneal areolar space; in fact in a hundred dissections made by this English observer, he had never yet seen the posterior surface of the cæcum uncovered by peritoneum nor had he encountered a meso-colon. In reality in the great majority of cases, the entire beginning of the large intestine was completely surrounded by peritoneum up and onto the ascending colon. Moreover the mesentery of the appendix was derived from the ileum in every instance. Hence perforating appendicitis and the still more rare cœcitis must primarily produce a peritoneal suppuration, limited or diffused, or else by the lucky occurrence of adhesions before the accomplishment of the perforation, give rise thus to a subperitoneal abscess, the so-called para-typhlitis. Both varieties undoubtedly exist, but if it be admitted that the first form occurs, it is right that the matter should be evacuated as soon as its presence is

recognized. This could be obtained early by the use of an aspirating needle, or the question of time would generally decide surgical interference. This, in a consideration of over two hundred and fifty cases, had been placed by Fitz at not later than the third day, and he should certainly agree with this dictum in those cases where the symptoms were marked and existed with persistent temperature elevation. He believed that many of the cases that recovered, either evacuated themselves by the bowel or bladder or underwent absorption, which was not often, or were, what was more likely, cœcitis from fæcal impaction, and not of a suppurative character, and there he had seen and learned to expect a ready subsidenee of temperature heat after the administration of anodynes. Fitz and Bartholow firmly held the view of the intraperitoneal origin and seat of these abscesses. Individually he had never yet regretted operating too early in cases of right iliac inflammatory tumors. His impression of the site of such abscesses had been formed for many years, he having been led to the investigation by once witnessing the occurrence of a rupture of a perityphlitic abscess into the general peritoneal cavity under very slight palpation of the tumor, with a rapidly fatal issue without surgical interference, as the accident took place before the general use of laparotomy. He concluded by reiterating the fact that if a laparotomy was necessitated for an advanced general suppurative peritonitis or even in the rarer cases of acute perforation of the appendix, by lifting out the intestine filling the right iliac fossa, the entire field of exploration was fully brought into view, and that lesions difficult to detect at a post-mortem examination could be recognized in the living subject quite readily by changes in color and consistence which were lost in cadaveric alterations.

H. B. Sands, M.D. (New York) had operated for perityphlitis a great many times, but had never yet found a circumscribed abscess bounded simply by coils of adherent intestine; he was aware that such was a common view, but he believed it to be inaccurate. He had also observed that when perforation of the appendix occurred into the serous cavity, the result was always fatal. A short time ago a case came under his observation in which the symptoms of circumscribed

tumor were wanting, but in which there were present marked pain and tenderness in the cæcal region. In that case, upon incision through the abdominal wall over the seat of tenderness, a small amount of pus had escaped, and, on putting the finger into the opening, the feeling of intestine was imparted; death without autopsy ensued a few hours after. He would not dispute the accuracy of Treves' observations, but he deprecated early operations, (1) because they might be unnecessary and (2) because they might be unsafe. He had seen a large number of cases in which the inflammatory swelling had subsided without any surgical operation and the patients got well. The danger of spontaneous opening of the abscess into the peritoneum at an early period he believed to be exaggerated and unsupported by clinical facts; he could recall but a single instance in which such a rupture had occurred as early as the seventh day of the disease. Concerning the second point—the risk attending early operations—he believed it to depend on the liability of the entrance of the fœtid contents of the abscess into the peritoneal sac. In contending that circumscribed perityphlitic abscesses were usually external to the peritoneum, he did not mean to deny the anatomical relations of the cæcum, which he thought were generally understood; but he failed to see why the almost complete investment of the cæcum by the peritoneum or the presence of a mesentery attached to the appendix vermiformis should determine the entrance of fæcal matter, escaping from a perforated appendix, into the peritoneal cavity. His supposition was, that in cases of circumscribed abscess due to such perforation, this was preceded by adhesion of the serous membrane covering the appendix to that lining the iliac fossa, and that thereby the latter was lifted by the pus and fæcal matter, and the invasion of the peritoneal sac prevented. But adhesions would not usually be limited to the perforated appendix; they would often involve the peritoneum covering the cæcum, the abscess, and the back of the anterior abdominal wall; such adhesions, however, would be absent at an early period, and hence one danger connected with early incision. He remembered several cases in which the presence of pus had been demonstrated by the use of the aspirating needle, and in which an incision made carefully along the latter held *in situ*, opened the peritoneal sac, adhesions not yet having taken

place. After closing the opening made in the serous sac, adhesions ultimately occurred and the abscess evacuated its contents externally with safety and without further surgical operation. It was fair to presume that the simultaneous opening of the peritoneal sac and the abscess cavity might be followed by a fatal result. He would not dispute the desirability of an early evacuation of the contents of a perityphlitic abscess, but he thought that the danger attending such an operation should be duly weighed. Very few cases would be injured by being allowed to remain for a week or ten days according to the local symptoms; to operate always within two or three days from the onset of the disease would be much like performing laparotomy for every case of pain in the abdomen. Another reason for delay was that, even when the peritoneum covering the abscess did not become adherent to that lining the back of the anterior abdominal wall, the line of reflection might be pushed upward by the growing swelling so as to be above that generally selected for incision. Being asked if, given a case where there was no appreciable tumor, symptoms should lead to the use of the needle and pus be detected, there would be greater danger of opening the peritoneum at that time than in operating for ligature of the external iliac artery, the incision being close to Poupart's ligament, he replied that he thought it would be possible, but it might be more difficult in consequence of morbid alterations due to inflammation.

C. K. Briddon, M.D. (New York) had operated in a case where there was a swelling, the most prominent portion of which appeared to be three inches above Poupart's ligament, with a zone of less resistance immediately above the ligament. An aspirating needle introduced one inch above it gave exit to pus; it was left in position and the usual incision made. When the transversalis fascia was reached, it was found that the peritoneum had not been pushed up by the abscess and that the needle had consequently passed through two layers of it. It was then displaced upward by the fingers until the cavity of the abscess was opened without further implication of the peritoneum than that caused by the needle; the patient made a prompt recovery. He regretted operating early in a case where the swelling was situated deep

in the iliac fossa and aspiration gave exit to pus. The needle was left *in situ* and, after division of the muscular and aponeurotic coverings by the scalpel, further separation was made by the fingers until a cavity was reached at a very considerable depth from the surface; it contained only a small amount of pus; it was drained and dressed in the usual manner and did well for forty-eight hours, when an acute and rapidly fatal peritonitis was developed. He had made autopsies in three cases where death had occurred in from twenty-four to thirty-six hours from perforation of the appendix; there were no limiting adhesions, but general diffuse peritonitis—no formation of abscesses at all, as he did not think there had been time.—*N. Y. Surgical Society*, Dec. 8, 1886.

BONES, JOINTS, ORTHOPÆDIC.

I. Osteoplastic Operation after Necrosis of the Femur. By FREDERICK LANGE, M.D., (New York). A German man, æt. 46 years, had when ten years old what was doubtless a severe acute osteomyelitis with spontaneous fracture of the thigh, which resulted in an angular bend at a point between the middle and lower third of the right femur, with eight inches of shortening and bony ankylosis of the knee-joint at an angle of about 140°. A number of sinuses had opened, and suppuration had persisted for about eleven years, when it ceased and so remained for nine years, when sinuses formed again and did not heal. There had been no discharge of bone nor had any surgical operation been performed until thirty-five years after the original attack, Dr. Lange performed necrotomy by making an H-shaped incision, forming flaps which included the periosteum, and removing the patella and the anterior portion of the lower third of the bone, so that after the removal of numerous sequestra, a shallow bone cavity was formed, into which the soft parts were depressed and fixed by strong straight needles. There could have been no necrosis from the first attack or the suppuration would not have ceased for nine years, and the pieces of dead bone found at the operation belong to a process of secondary necrosis; indeed they present a character quite different from that of the usual sequestrum, resembling dead cancellous tissue, and